

State of California  
California Environmental Protection Agency  
AIR RESOURCES BOARD

**Final Statement of Reasons for Rulemaking,  
Including Summary of Comments and Agency Response**

**PUBLIC HEARING TO CONSIDER THE AMENDMENT OF REGULATIONS REGARDING  
STATIONARY SOURCE TEST METHODS**

Public Hearing Dates: August 27, 1998  
Agenda Item No.: 98-9-3

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**I. Introduction:**

On August 27, 1998, the Air Resources Board (the "Board") conducted a public hearing to consider the amendment of 20 non-vehicular or stationary source test methods.

At the August 27 public hearing, the Board adopted Resolution 98-38 approving the amendment of regulations that incorporate by reference the twenty test methods. The revised regulations are found in Title 17, California Code of Regulations (CCR), Sections 94101, 94102, 94117, 94103, 94104, 94118, 94119, 94106, 94108, 94109, 94110, 94120, 94121, 94122, 94111, 94112, 94137, 94113, 94123, and 94124. The incorporated amended stationary source test methods are:

Method 1, Sample and Velocity Traverses for Stationary Sources (incorporated in 17 CCR 94101),

Method 2, Determination of Stack Gas Velocity and Volumetric Flow Rate (Type S Pitot Tube) (incorporated in 17 CCR 94102),

Method 2A, Direct Measurement of Gas Volume through Pipes and Small Ducts (incorporated in 17 CCR 94117),

Method 3, Gas Analysis for Carbon Dioxide, Oxygen, Excess Air, and Dry Molecular Weight (incorporated in 17 CCR 94103),

Method 4, Determination of Moisture Content in Stack Gases (incorporated in 17 CCR 94104),

Method 5A, Determination of Particulate Emissions from the Asphalt Processing and Asphalt Roofing Industry (incorporated in 17 CCR 94118),

Method 5E, Determination of Particulate Emissions from the Wool Fiberglass Insulation Manufacturing Industry (incorporated in 17 CCR 94119),

Method 6, Determination of Sulfur Dioxide Emissions from Stationary Sources (incorporated in 17 CCR 94106),

Method 8, Determination of Sulfuric Acid Mist and Sulfur Dioxide Emissions from Stationary Sources (incorporated in 17 CCR 94108),

Method 10, Determination of Carbon Monoxide Emissions from Stationary Sources (incorporated in 17 CCR 94109),

Method 11, Determination of Hydrogen Sulfide Content of Fuel Gas Streams in Petroleum Refineries (incorporated in 17 CCR 94110),

Method 12, Determination of Inorganic Lead Emissions from Stationary Sources (incorporated in 17 CCR 94120),

Method 13A, Determination of Total Fluoride Emissions from Stationary Sources (SPADNS Zirconium Lake Method) (incorporated in 17 CCR 94121),

Method 13B, Determination of Total Fluoride Emissions from Stationary Sources (Specific Ion Electrode Method) (incorporated in 17 CCR 94122),

Method 15, Determination of Hydrogen Sulfide, Carbonyl Sulfide and Carbon Disulfide Emissions from Stationary Sources (incorporated in 17 CCR 94111),

Method 16, Semicontinuous Determination of Sulfur Emissions from Stationary Sources (incorporated in 17 CCR 94112),

Method 16A, Determination of Total Reduced Sulfur Emissions from Stationary Sources (Impinger Technique) (incorporated in 17 CCR 94137),

Method 17, Determination of Particulate Matter Emissions from Stationary Sources (In-Stack Filtration Method) (incorporated in 17 CCR 94113),

Method 20, Determination of Nitrogen Oxides, Sulfur Dioxide and Oxygen Emissions from Stationary Gas Turbines (incorporated in 17 CCR 94123), and

Method 21, Determination of Volatile Organic Compound Leaks (incorporated in 17 CCR 94124).

At the public hearing, the staff presented, and the Board approved, modifications to the

regulations as released on July 10, 1998, specifically Method 12 has been modified. As modified, Method 12 was made available to the public for a 15-day comment period between April 21, 1999 and May 6, 1999, pursuant to Government Code Section 11346.8(c). The "Notice of Public Availability of Modified Text" was mailed with the modified text of the regulations by April 21, 1999, as required by Title 1, CCR, section 44.

A Staff Report was prepared as the Initial Statement of Reasons for the proposed rulemaking. The Staff Report (including an errata page) was released on July 10, 1998, and is incorporated by reference herein. The Final Statement of Reasons updates the Staff Report by explaining why the proposed test methods were modified, as well as summarizing the public comments received and presenting the Board's responses to the comments.

## **II. Background**

Section 39607(d) of the Health and Safety Code requires the ARB to adopt test procedures to determine compliance with ARB and local air pollution control district non-vehicular emission standards.

Since 1983, the Board has adopted 61 test methods which are applicable to a wide variety of non-vehicular, stationary sources and to gasoline vapor recovery. The adopted stationary source test methods are referenced in Sections 94101-94161, Title 17, California Code of Regulations (CCR).

The twenty revised stationary source test methods are part of the Board's ongoing effort to provide technically up-to-date and accurate test methods for measuring emissions of air pollutants. The July 10, 1998, staff report provides background and reasons for adoption and revision of each of the procedures.

## **III. Changes to the Originally Proposed Certification and Test Procedures**

As described above, the Board directed modifications to one test method made in response to the comment received during the 45 days prior to the public hearings. The descriptions of, and the reasons for, the modifications to the method (Method 12) are explained in Section V, below.

## **IV. Environmental and Economic Impacts**

The proposal is expected to have minimal environmental impacts. Rather, the proper use of the revised test methods will help to reduce emissions from stationary emissions sources.

The economic impacts of this proposal are discussed in the July 1998 Initial Statement of Reasons. There are no significant cost increases in testing due to these amendments.

## **V. Findings and Determinations**

The Board has determined that this regulatory action will not create costs or savings, as defined in Government Code section 11346.5(a)(6), to any state agency or in federal funding to the state, or result in a mandate on local agencies or school districts, the costs of which are reimbursable by the state pursuant to Part 5 (commencing with section 17500), Division 4, Title 2 of the Government Code, or other nondiscretionary savings to local agencies.

In accordance with Government Code section 11346.3, the Board has also determined that the proposed regulatory action will not affect the creation or elimination of jobs within the State of California, the creation of new business or elimination of existing businesses with California, or the expansion of businesses currently doing business within California. An assessment of the economic impacts of this regulatory action can be found in the Staff Report/Initial Statement of Reasons (Staff Report).

The Board has further determined, for the reasons set forth in the Staff Report, that no alternatives considered by the agency would be more effective in carrying out the purpose for which the regulatory action was proposed or would be as effective and less burdensome to affected private persons, than the action taken by the Board.

## **VI. Summary of Comments and Testimony Received in Response to 45-Day Notice**

One comment was received in response to the 45-day notice; the comment was from Quanterra, Inc. No oral testimony was given at the August 27, 1998, public hearing. No comments were received in response to the 15-day notice. Summarized below is the comment, as well as staff response to the comment. It recommends modifying Method 12.

### **Comment**

Quanterra Inc. commented on various issues which would make Method 12, which is for determination of lead emissions, more consistent with Method 436 which is for determination of multiple metals emissions including lead. Quanterra noted that an alternative to making the methods more similar would be allowing use of inductively coupled plasma atomic emission spectrometry (ICP-AES) as an alternative to atomic absorption spectrometry within Method 12 and use of Method 436 as an alternative to Method 12.

### **Staff Response:**

Revisions originally proposed to ARB Method 12 were in large part intended to enhance the compatibility of this method with EPA Method 12. This is considered more important than consistency with ARB Method 436. However, the suggestion that ICP-AES be allowed as an alternative analytical technique is consistent with EPA guidance regarding alternatives to EPA Method 12, and ARB Method 436 is recognized by both ARB and

EPA as technically equivalent to ARB Method 12 for measurement purposes. For these reasons, provisions allowing appropriate use of ICP-AES and Method 436 as alternatives to Method 12 procedures were drafted by staff and added to Method 12 as 15-day modifications at the direction of the Board.